

In the Claims:

17) (Currently Amended) A method of forming a metal product having an edge area comprising a cutting edge having a wear resistant surface, comprising the steps of: forming a workpiece substrate having an edge area comprising a cutting edge portion; performing a high-density coating process to coat at least the cutting edge portion of the workpiece substrate with a wear resistant coating material; performing a hot isostatic pressing treatment on the coated workpiece substrate to obtain a metal product having a wear resistant surface comprised of the coating material, the hot isostatic pressing treatment comprising disposing the coated workpiece substrate within a chamber, filling the chamber with an inert gas, and heating and pressurizing the inert gas so that the wear resistant surface being is formed at the cutting edge portion and having a diffusion bonding between the coating material and the workpiece substrate; and sharpening the cutting edge portion so that the diffusion bonding between the coating material and the workpiece substrate retains the wear resistant coating material on the cutting edge portion during the sharpening process of the cutting edge portion and during use of the cutting edge portion of the formed metal product.

18) (previously presented) A method of forming a metal product having a cutting edge according to claim 17; wherein the step of performing the high-density coating process comprises performing a hyper velocity oxy-fuel thermal spray process.

19) (previously presented) A method of forming a metal product having a cutting edge according to claim 18; wherein the step of hot isostatic pressing treating comprises the step of heating the coated cutting tool substrate to a temperature that is substantially 80% of the melting point of the coating material; and pressurizing the coated cutting tool substrate to a pressure substantially between 20 and 50 percent of the yield strength of the [metal alloy] coating material in an inert gas atmosphere.

20) (previously presented) A method of forming a metal product having a cutting edge according to claim 19; further comprising the step of performing a sintering heat treatment on the coated workpiece substrate to remove entrapped gas in the coating material before performing the hot isostatic pressing treatment so that the formed metal product has a relatively smooth surface texture.

21) (previously presented) A method of forming a metal product having a cutting edge according to claim 17; wherein the workpiece substrate comprises a high speed steel substrate composition.

22) (previously presented) A method of forming a metal product having a cutting edge according to claim 17; wherein the coating material comprises a hard and durable metal such as Cobalt, Carbide and TiN.

23) (previously presented) A method of forming a metal product having a cutting edge according to claim 17; wherein the workpiece substrate comprises a nickel or cobalt-base superalloy; and the step of performing the high-density coating process comprises performing a high-density coating process such as a hyper velocity oxy-fuel thermal spray process or a detonation gun process to apply the coating material as a high-density coating.

25) (previously presented) A method of forming a metal product having a cutting edge according to claim 17, wherein the cutting tool comprises one of a drill bit, end mill, lathe tool bit, saw blade, planer knife, and cutting tool insert.

26) (previously presented) A method of forming a metal product having a cutting edge according to claim 17; wherein the metal product formed comprises one of an ice skate blade, snow ski edge, pen tip and fishing hook.

27) (Currently Amended) A method of forming a kitchen knife having an edge area comprising a cutting edge having a wear resistant surface, comprising the steps of:

forming a knife substrate having an edge area comprising a cutting edge portion; performing a high-density coating process to coat at least the cutting edge portion of the knife substrate with a wear resistant coating material; performing a hot isostatic pressing treatment on the coated knife substrate to obtain a kitchen knife having a wear resistant surface comprised of the coating material, the hot isostatic pressing treatment comprising disposing the coated workpiece substrate within a chamber, filling the chamber with an inert gas, and heating and pressurizing the inert gas so that the wear resistant surface being is formed at the cutting edge portion and having a diffusion bonding between the coating material and the knife substrate; and sharpening the cutting edge portion so that the diffusion bonding between the coating material and the knife substrate retains the wear resistant coating material on the cutting edge portion during an edge sharpening process of the cutting edge portion and during use of the cutting edge portion of the formed kitchen knife.

28) (previously presented) A method of forming a kitchen knife having a cutting edge according to claim 27; wherein the step of performing the high-density coating process comprises performing a hyper velocity oxy-fuel thermal spray process.

29) (previously presented) A method of forming a kitchen knife having a cutting edge according to claim 28; wherein the step of hot isostatic pressing treating comprises the step of heating the coated cutting tool substrate to a temperature that is substantially 80% of the melting point of the coating material; and pressurizing the coated cutting tool substrate to a pressure substantially between 20 and 50 percent of the yield strength of the coating material in an inert gas atmosphere.

30) (previously presented) A method of forming a kitchen knife having a cutting edge according to claim 29; further comprising the step of performing a sintering heat treatment on the coated knife substrate to remove entrapped gas in the coating material before performing the hot isostatic pressing treatment so that the formed kitchen knife has a relatively smooth surface texture.

31) (previously presented) A method of forming a kitchen knife having a cutting edge according to claim 27; wherein the coating material comprises a hard and durable metal such as Cobalt, Carbide and TiN.

32) (Currently Amended) A method of forming a cutting tool having a cutting edge having a wear resistant surface, comprising the steps of: forming a cutting tool substrate having a cutting edge portion; performing a high-density coating process to coat at least the cutting edge portion of the cutting tool substrate with a wear resistant coating material; and performing a hot isostatic pressing treatment on the coated cutting tool substrate to obtain a cutting tool having a wear resistant surface comprised of the coating material, the hot isostatic pressing treatment comprising disposing the coated workpiece substrate within a chamber, filling the chamber with an inert gas, and heating and pressurizing the inert gas so that the wear resistant surface ~~being~~ is formed at the cutting edge portion and having a diffusion bonding between the coating material and the cutting tool substrate, the diffusion bonding between the coating material and the cutting tool substrate being effective for retaining the wear resistant coating material on the cutting edge portion during an edge sharpening process of the cutting edge portion and during use of the cutting edge portion of the formed cutting tool.

33) (previously presented) A method of forming a cutting tool having a cutting edge according to claim 32; wherein the step of performing the high-density coating process comprises performing a hyper velocity oxy-fuel thermal spray process.

34) (previously presented) A method of forming a cutting tool having a cutting edge according to claim 33; wherein the step of hot isostatic pressing treating comprises the step of heating the coated cutting tool substrate to a temperature that is substantially 80% of the melting point of the coating material; and pressurizing the coated cutting tool substrate to a pressure substantially between 20 and 50 percent of the yield strength of the coating material in an inert gas atmosphere.

35) (previously presented) A method of forming a cutting tool having a cutting edge according to claim 34; further comprising the step of performing a sintering heat treatment on the coated cutting tool substrate to remove entrapped gas in the coating material before performing the hot isostatic pressing treatment so that the formed cutting tool has a relatively smooth surface texture.

36) (previously presented) A method of forming a cutting tool having a cutting edge according to claim 32; wherein the coating material comprises a hard and durable metal such as Cobalt, Carbide and TiN.